

REMARKS

The Claim Rejections Under 35 USC § 112, first paragraph

In the claims, the term "sealed" is changed to "closed" to further clarify the claims.

The Office Action alleges that the specification does not provide written description for the claim language that the opening is "sealed [now closed] only with sealing material which is hermetically sealed to said brittle-fracture material" because the specification does not state that other materials are excluded. Even if such exclusion of other materials is not explicitly stated in the specification, applicants clearly describe embodiments where the opening on the molded element is closed only with sealing material, which provides basis for the claim feature at issue. For example, the drawings illustrate a variety of embodiments where the closure clearly only includes material from the sealing material. No other material at the point of the hole is present in any of the drawings. Additionally, the specification teaches that the pressure weld is formed by the application of high pressure, whereby "significant plastic flow on the part of at least one joining partner" is achieved to form the weld. See page 8, fourth full paragraph. Here, there are only two joining partners - sealing material and brittle fracture material. One of ordinary skill in the art would understand this to mean that the sealing material and the brittle fracture material are welded by the application of pressure whereby the weld itself is formed from the material achieving plastic flow, which material is of at least one of the sealing material and the brittle fracture material, and not by some other material applied there-between. Thus, the specification conveys to one of ordinary skill in the art that the claimed matter was in the possession of applicants at the time the application was filed.

The law is clear that literal support for claim language is not required. See, for example, *In re Wertheim*, 541 F.2d 257, 191 USPQ 90 (CCPA 1976), stating that adequate description under the first paragraph of 35 U.S.C. 112 does not require *literal* support for the claimed invention, and *In re Anderson*, 471 F.2d 1237, 176 USPQ 331 (CCPA 1973), stating that it is sufficient if the originally-filed disclosure would have conveyed to one having ordinary skill in the art that an appellant had possession of the concept of what is claimed.

Reconsideration is respectfully requested.

The Claim Rejections Under 35 USC § 102

The Office Action alleges that Pace anticipates. The feature of former claim 4, which is now cancelled, is incorporated into each independent claim.

The Office Action alleges that “Pace discloses that the sealing element is a brittle fracture (green ceramics, col. 7, line 13).”

Applicants respectfully disagree. Pace on column 7, lines 1-14 teaches that

A planar substrate 510 provided with conductive feedthroughs 520, 521 and terminals 522 for connection to the next level of electronic packaging is illustrated in FIG. 5a. Any suitable electronic insulating material may be used for the substrate 510. Suitable material include silicon, sapphire and ceramics and glass/ceramics comprising alumina, mullite, cordierite, beryllia, aluminum nitride, boron nitride, silicon nitride, silicon carbide and silicon carbide with a small percentage of beryllia.

The feed-throughs 520 and 521 should have good conductivity and preferably maintain a hermetic seal. Refractive metal feed-throughs of tungsten or molybdenum prepared by the co-firing metal pastes in green ceramics provide hermetic feed-throughs.

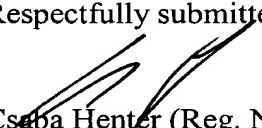
The last sentence does not mean and does not convey to one of ordinary skill in the art that the feed-throughs are brittle-fracture. They are not made of green ceramics or from firing a mixture of green ceramics and metal pastes.

The planar substrate 510 can be, e.g., ceramic or glass/ceramic, which can be produced by firing green ceramics or green glass/ceramics, and the metal feed-throughs, which are clearly taught to be made of tungsten or molybdenum, can be produced by firing metal pastes. The term “co-firing metal pastes in green ceramics provide hermetic feed-throughs” means that the metal paste which will become the metal feed-through upon firing, is placed in green ceramics (not in admixture therewith) e.g., the paste is placed in a hole in the green ceramic. The latter green ceramic will become the planar substrate upon firing, and the metal paste will become the metal feed-through. The two are co-fired to yield a product, which is a metal feed-through hermetically sealed within a hole in a ceramic or glass/ceramic planar substrate. The metal feed-through is the sealing material and is not brittle fracture. It does not comprise brittle fracture material.

Reconsideration is respectfully requested.

The Commissioner is hereby authorized to charge any fees associated with this response or credit any overpayment to Deposit Account No. 13-3402.

Respectfully submitted,



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